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| APPLICATION NO. | F | ILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION N |
|--------------------------|------|------------|-----------------------|----------------------|----------------|
| 09/506,873 | | 02/16/2000 | Scott E. Kloppenstein | RCA89548 | 6342 |
| 24498 | 7590 | 06/23/2005 | | EXAMINER | |
| THOMSO: PATENT O | | SING INC. | SHELEHEDA, JAMES R | | |
| PO BOX 5312 | | | | ART UNIT PAPER NUMBE | |
| PRINCETON, NJ 08543-5312 | | | | 2617 | |

DATE MAILED: 06/23/2005

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BEFORE THE BOARD OF PATENT APPEALS AND INTERFERENCES

Application Number: 09/506,873 Filing Date: February 16, 2000

Appellant(s): KLOPPENSTEIN, SCOTT E.

Kloppenstein, Scott E. For Appellant

EXAMINER'S ANSWER

This is in response to the appeal brief filed March 31, 2005.

(1) Real Party in Interest

A statement identifying the real party in interest is contained in the brief.

(2) Related Appeals and Interferences

A statement identifying the related appeals and interferences which will directly affect or be directly affected by or have a bearing on the decision in the pending appeal is contained in the brief.

(3) Status of Claims

The statement of the status of the claims contained in the brief is correct.

(4) Status of Amendment

The appellant's statement of the status of amendments contained in the brief is correct.

(5) Summary of Claimed Subject Matter

The summary of claimed subject matter contained in the brief is correct.

(6) Grounds of Rejection to be Reviewed on Appeal

The appellant's statement of the grounds of rejection to be reviewed in the brief is correct.

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(7) Claims Appealed

The copy of the appealed claims contained in the Appendix to the brief is correct.

(8) Prior Art of Record

| 6,249,320 | Schneidewend et al. | 6-2001 |
|--------------------|---------------------|---------|
| 6,313,886 | Sugiyama et al. | 11-2001 |
| 5,625,406 | Newberry et al. | 4-1997 |
| 5,550,576 | Klosterman | 8-1996 |
| 5,894,320 | Vancelette | 4-1999 |
| US 2002/0049973 A1 | Alten et al. | 4-2002 |
| US 2003/0056216 A1 | Wugofski et al. | 3-2003 |

(9) Grounds of Rejection

The following ground(s) of rejection are applicable to the appealed claims:

Claim 24 is rejected under 35 U.S.C. 102(e) as being anticipated by Schneidewend. This rejection is set forth in a prior Office Action, mailed on November 3, 2004.

Claims 1-6 and 8-11 are rejected under 35 U.S.C. 103(a) as being unpatentable over Sugiyama et al. in view of Newberry et al. This rejection is set forth in a prior Office Action, mailed on November 3, 2004.

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Claims 12-14, 16 and 18-20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Klosterman et al. in view of Sugiyama et al. This rejection is set forth in a prior Office Action, mailed on November 3, 2004.

Claim 7 is rejected under 35 U.S.C. 103(a) as being unpatentable over Sugiyama et al. and Newberry et al. and further in view of Vancelette. This rejection is set forth in a prior Office Action, mailed on November 3, 2004.

Claim 15 is rejected under 35 U.S.C. 103(a) as being unpatentable over Klosterman et al. and Sugiyama et al. and further in view of Vancelette. This rejection is set forth in a prior Office Action, mailed on November 3, 2004.

Claims 25-29 are rejected under 35 U.S.C. 103(a) as being obvious over Schneidewend in view of Alten et al. This rejection is set forth in a prior Office Action, mailed on November 3, 2004.

Claim 17 is rejected under 35 U.S.C. 103(a) as being unpatentable over Klosterman et al. and Sugiyama et al. and further in view of Wugofski et al. This rejection is set forth in a prior Office Action, mailed on November 3, 2004.

(11) Response to Argument

a. Rejection under 35 U.S.C. 102(e) over Schneidewend.

First, appellant argues that Schneidewend discloses a first identification number corresponding to a broadcast channel and a second identification number corresponding to sub-channels in on the broadcast channel (appellant's appeal brief, page 11, lines 8-11), and therefore fails to disclose a physical transmission number

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corresponding to a virtual channel and a virtual channel identification number of said virtual channel (appellant's appeal brief, page 11, lines 17-22).

In response, Schneidewend specifically discloses a RF channel (or physical transmission channel; column 4, lines 38-42, column 6, lines 21-29 and represented in Fig. 3 as Channel_PTC, 315) which carries a plurality of sub-channels (column 4, lines 43-50, column 6, lines 21-29) which are identified by both a *major* number **and** a *minor* number (column 6, lines 21-39 and represented in Fig. 3 as bundle_number, 300 and channel_number_in_bundle, 305, respectively). Thus, the physical transmission channel (RF channel) is clearly corresponding with (i.e. carrying) a virtual channel with a number (major and minor numbers for the sub-channel). The major and minor identifiers (or virtual channel number) are completely *distinct* from the physical transmission (as shown being separately defined in Fig. 3 and further in column 6, lines 29-35, wherein the major identifier *may or may not* be the same as the broadcast RF channel).

Second, appellant argues that Schneidewend discloses wherein the first identification number corresponds directly with the RF channel and the second identification number corresponds to the virtual sub-channels (appellant's appeal brief, page 12, lines 5-7), and therefore fails to disclose a major number associated with an information provider and a group of sub-channels and a minor number identifying a sub-channel from among said group of sub-channels (appellant's appeal brief, page 12, lines 1-4).

In response, as indicated above, Schneidewend specifically discloses three distinct numbers. An RF channel (315 in Fig. 3), a major identifier (300 in Fig. 3) and a minor identifier (305 in Fig. 3). He further specifically states that the major number may or may not be the same as the RF channel (see column 6, lines 29-35). Thus, while the major number may have the same *value* as the RF channel, it is a separate and distinct stored number.

Further, Schneidewend explicitly states that the major identifier is associated with an information provider (such as broadcaster Fox 5; column 6, lines 25-29) and that the minor identifier identifies a sub-channel from among said group of sub-channels (column 6, lines 35-42).

Lastly, appellant argues that Schneidewend cannot disclose displaying the physical transmission number corresponding to the virtual channel with said virtual channel identification number (appellant's appeal brief, page 12, lines 17-21).

In response, as shown in Fig. 12, Schneidewend specifically discloses displaying the major and minor identifiers along with the broadcaster in a list. Therefore, when the major number corresponding to a broadcaster has been selected to be the same as the RF channel, the physical transmission number is displayed with the virtual channel identification number (column 6, lines 25-35).

b. Rejection under 35 U.S.C. 103(a) over Sugiyama in view of Newberry.

First, appellant argues that while Sugiyama disclose tuning to both analog and digital channels, he makes no mention of the necessity of determining said identified broadcast channels being analog or digital (appellants appeal brief, page 15, lines 5-9) and further that Sugiyama would have no need for this determining as the purpose of Sugiyama's system is to receive two different types of digital signals and therefore that the analog tuner is irrelevant (appellant's appeal brief, page 15, lines 11-17).

In response, as shown in Fig. 4, Sugiyama discloses a system with a single tuner for tuning to a channel (Fig. 4, tuner 404; column 4, lines 12-17) and wherein the received signal is then received and processed by either an analog demodulator or a digital demodulator (column 4, lines 12-22). As the analog and digital signals are handled and processed completely separately (see Fig. 4 and column 4, lines 12-22), some "determination" must take place in some form in that only one of the two types of demodulators will act upon the signal and process it. Further, Sugiyama specifically discloses wherein the output signals from either the analog video processing circuit or the video decoder are *selectively* connected to video display, under control of the control circuit (column 4, lines 46-49). The active *selection* of a digital decoder output over the analog is a clear indication that some determination has taken place to selectively make that decision.

Second, in response to appellant's arguments that because Sugiyama fails to disclose determining if the broadcast channel is analog or digital, he also fails to

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disclose "acquiring program guide information transmitted on said identified broadcast channel...", please see the arguments presented above in the first argument of (b).

Third, in response to appellant's arguments on page 16, that because Sugiyama fails to disclose acquiring program guide information transmitted on said identified broadcast channel in *response to the determination*, he also must fail to disclose "acquiring packetized program information... using said program guide information", please see the arguments presented above in the first argument of (b).

Fourth, on page 17 of the appeal brief, appellant argues that Newberry fails to disclose or suggest "identifying an individual broadcast channel of said plurality of broadcast channels in response to either (a) a first channel identification number and (b) a different second channel identification number" and "acquiring said packetized information comprising a program conveyed on said individual broadcast channel using said acquired program conveyed on said individual broadcast channel using said acquired program guide information."

In response, it is noted that Sugiyama was relied upon to teach all of these claimed features. Newberry was simply relied upon to teach extracting both analog and digital program guide information from received signals and the benefits therein.

Fifth, on page 18 of the appeal brief, appellant argues that there is no motivation to combine the Sugiyama and Newberry references.

In response to appellant's argument that there is no suggestion to combine the references, the examiner recognizes that obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See *In re Fine*, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988) and *In re Jones*, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). In this case, Newberry discloses a hybrid system which can access both analog and digital channels, and the ability to acquire program guide information from both types of channels for the benefit of allowing a user of a hybrid system to access program guide for all of their received analog *and* digital channels (see Newberry at column 1, line 65-column 2, line 8).

Further, it is noted that while Sugiyama specifically teaches extracting program guide information from digital channels, this in no way implies a specific desire to avoid using analog program guide information. It is incorrect to assume that simply because Sugiyama is silent in regards to the details of the analog channels that there would be no reason or motivation to add analog information to Sugiyama's system.

Lastly, appellant argues, on page 19 of the appeal brief, that the combined system of Sugiyama and Newberry would still fail to meet the claim limitations as they fail to disclose or suggest "determining said identified broadcast channel as being analog or digital" and further that the tuning process of Sugiyama is not equivalent to the claimed step of determining.

In response, please see the arguments presented above in the first argument of (b).

c. Rejection under 35 U.S.C. 103(a) over Klosterman in view of Sugiyama.

First, in response to appellant's arguments against Klosterman on page 21, it is noted that the Office Action admitted that Klosterman lacks the missing claimed features, Sugiyama was relied upon to disclose those specific features.

Second, appellant argues that Sugiyama fails to disclose that the acquired program guide contains "information mapping a first broadcast channel number to a first different channel number."

In response, Sugiyama was relied upon to teach the usage of program guide information which conforms to the PSIP protocol. As shown by Sugiyama, this protocol specifically teaches mapping a first broadcast number to a second broadcast number (for example, broadcast channel 38 has been mapped to channels 4.1 and 4.2 as shown in Fig. 1 and column 1, lines 35-58).

Third, appellant argues that Sugiyama fails to disclose a second program guide with mapping information.

In response, Klosterman was the reference relied upon to disclose a system which receives multiple program guides. Klosterman did not specifically disclose

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wherein the multiple program guides it received contained mapping information mapping a first channel to a second.

Sugiyama was then relied upon to teach acquiring program guide which contains "information mapping a first broadcast channel number to a first different channel number", as shown the *standard* protocol for PSIP.

It is the combination of Klosterman and Sugiyama which teaches acquiring a first and second program guide (as shown in Klosterman), wherein the acquired program guides contain mapping information mapping a first channel to a second channel (as shown in Sugiyama to conform with the PSIP standard).

Fourth, appellant argues on pages 22 and 23 of the appeal brief, that Sugiyama fails to disclose "tuning to receive packetized program information transmitted on said first different channel in response to user entry of said first broadcast channel number using said acquired program guide."

In response, Sugiyama discloses wherein a user will enter a first broadcast channel number (for example, virtual channel 4.1, see column 7, lines 5-49). The system itself will then tune to the physical channel selected by the user (in this case, 4.1 corresponds to physical channel 38, see Fig. 1, column 7, lines 39-49, column 1, lines 35-58 and Fig. 1).

Fifth, appellant argues that there is no motivation to combine Klosterman and Sugiyama.

In response to appellant's argument that there is no suggestion to combine the references, the examiner recognizes that obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See *In re Fine*, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988) and *In re Jones*, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). In this case, Sugiyama teaches using the PSIP standard protocol for program guide information (column 1, line 35-column 2, line 34). Use of the PSIP protocol has all of the typical benefits of allowing standardization and uniformity among program guide providers, and further allows the use of virtual channel mapping allowing related channel to be grouped together (column 1, lines 35-67).

Last, appellant argues, on page 24 of the appeal brief, that the combination of Klosterman and Sugiyama would not result in the claimed invention as Klosterman is silent towards the specific channel mapping information and Sugiyama discloses tuning to PSIP and non-PSIP transport streams.

In response, while Klosterman disclose receiving a plurality of program guides, the examiner has admitted he does not teach the required channel mapping.

Sugiyama was then relied upon to teach acquiring program guide which contains "information mapping a first broadcast channel number to a first different channel number", as shown the *standard* protocol for PSIP.

It is the combination of Klosterman and Sugiyama which teaches acquiring a first and second program guide (as shown in Klosterman), wherein the acquired program guides contain mapping information mapping a first channel to a second channel (as shown in Sugiyama to conform with the PSIP standard).

Any other features also taught by Sugiyama, such as the ability to also tune to non-PSIP streams, are irrelevant to the current relied upon combination. Sugiyama has solely been relied upon to teach the use of PSIP and motivations therein.

d. Rejection under 35 U.S.C. 103(a) as being unpatentable over Sugiyama and Newberry et al. and further in view of Vancelette.

First, in response to appellant's arguments, on page 26 of the appeal brief, concerning the determining step, please see the arguments presented above for (b).

Second, in response to appellant's argument, on page 27 of the appeal brief, that Vancelette is unrelated to a "second identification number" as he neither teaches or discloses "said second channel identification number is comprised of two elements, a major number and a minor number" the test for obviousness is not whether the features of a secondary reference may be bodily incorporated into the structure of the primary reference; nor is it that the claimed invention must be expressly suggested in any one or all of the references. Rather, the test is what the combined teachings of the references would have suggested to those of ordinary skill in the art. See *In re Keller*, 642 F.2d 413, 208 USPQ 871 (CCPA 1981).

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Sugiyama discloses a channel identification number consisting of a major number (corresponding to the broadcast channel; column 1, lines 35-47) and a minor number (corresponding to the sub channel; column 1, lines 35-47).

Vancelette discloses a broadcast channel consisting of a plurality of sub channels (column 6, lines 6-24 and column 11, lines 20-40) and wherein once user enters only the broadcast channel (column 6, lines 32-37) a default sub-channel is selected and displayed (column 6, lines 32-37).

It is the combination of Sugiyama and Vancelette which would result in the claimed invention by a user only entering the major channel number (corresponding to the broadcast channel of Sugiyama) and thereupon receiving a default one of the subchannels (as taught by Vancelette).

Last, in response to appellant's arguments that the combination of Sugiyama,

Newberry and Vancelette are not combining into the currently claimed invention, please
see the arguments presented in (b) and (d) above.

e. Rejection under 35 U.S.C. 103(a) over Klosterman and Sugiyama and further in view of Vancelette.

In response to appellant's arguments in regards to the combination of Klosterman, Sugiyama and Vancelette, please see the arguments presented in (c) and (d) above.

f. Rejection under 35 U.S.C. 103(a) over Schneidewend in view of Alten.

In response to appellant's arguments in regards to the combination of

Schneidewend with Alten, please see the arguments presented in (a) above.

g. Rejection under 35 U.S.C. 103(a) over Klosterman and Sugiyama and further in view of Wugofski.

First, in response to appellant's arguments, on page 35 of the appeal brief, please see the arguments presented in (c) above.

Second, in response to appellant's statements on page 36 of the appeal brief towards the results of the combination of Klosterman with Sugiyama and Wugofski, the test for obviousness is not whether the features of a secondary reference may be *bodily incorporated* into the structure of the primary reference; nor is it that the claimed invention must be expressly suggested in any one or all of the references. Rather, the test is what the combined teachings of the references would have suggested to those of ordinary skill in the art. See *In re Keller*, 642 F.2d 413, 208 USPQ 871 (CCPA 1981).

As stated previously, Klosterman discloses a system wherein multiple different program guides are received. Sugiyama further teaches wherein a received program guide will contain information mapping a first number to a second number (as indicated by the PSIP protocol).

Wugofski was then relied upon to further disclose selecting one program guide over another when the program guides share the same broadcast number (see

Wugofski at paragraphs 29 and 30). This provides the clear benefit of eliminating channel conflicts between the plural program sources (see Wugofski at paragraph 30).

Any other features also taught by Sugiyama, such as the ability to monitor a user and manage a list of favorite channels, are irrelevant to the current relied upon combination. Wugofski has solely been relied upon to teach eliminating channel conflicts by selecting one program guide over another.

For the above reasons, it is believed that the rejections should be sustained.

Respectfully submitted,

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James Sheleheda Patent Examiner Art Unit 2617

JS June 20, 2005

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